

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1-27. (Canceled)

28. (Currently Amended) A method for identifying and obtaining an inhibitor, capable of modifying the paired helical filaments (PHF) formation comprising the steps of:

(a) incubating a peptide comprising a specific tau derived peptide as defined in ~~any one of SEQ ID NOs 6, 7, 8 and 9 or (a) fragment(s) thereof, SEQ ID NO. 9~~ with a compound to be screened under conditions which permit assembly of said tau-derived peptide into nucleation sites for PHF assembly and/or into aggregation products; and

(b) detecting the presence, decrease, or absence of nucleation sites for PHF assembly, and/or the presence, decrease or absence of aggregation products, wherein said absence and/or decrease of is indicative of putative inhibitors of PHF formation.

29. (Previously Presented) The method of claim 28, wherein said incubation step is carried out in the presence of assembly-competent tau protein(s) and/or assembly-competent tau protein fragments and wherein in step (b) the presence, decrease and/or absence of PHF or tau filaments is detected.

30-32. (Canceled)

33. (Previously Presented) A method for the preparation of a pharmaceutical composition comprising the putative inhibitors for PHF formation identified, obtained and/or screened in step (b) of claim 28 or derivatives thereof, in a pharmaceutically acceptable form by synthesizing and/or formulating said inhibitors.

34. (Previously Presented) The method of claim 28, said peptide comprising a tau-derived peptide is bound to a solid phase.

35. (Previously Presented) The method of claim 28, wherein said incubation step is carried out in the presence of (poly)anions.

36. (Previously Presented) An inhibitor identified or obtained by the method of claim 28.

37. (Currently Amended) The inhibitor of claim 36 which specifically binds to a peptide comprising the tau-derived peptides as defined in ~~any one of SEQ ID NOs. 6, 7, 8 or 9 or (a) fragment thereof~~ SEQ ID NO. 9.

38. (Previously Presented) The inhibitor of claim 37 which is an antibody, an aptamer or a small molecule peptide.

39. (Previously Presented) The inhibitor of claim 38 which is a monoclonal antibody.

40. (Previously Presented) A composition comprising the inhibitor as claim 36.

41. (Currently Amended) The composition of claim 40, which is a diagnostic or a pharmaceutical composition further comprising, ~~optionally~~, suitable means of detection and/or a pharmaceutically acceptable carrier, excipient and/or diluent.

42-46. (Canceled)

47. (Currently Amended) A kit useful for identifying an inhibitor capable of modifying the PHF formation comprising at least one of the following:

(a) a peptide comprising are specific tau derived peptide as defined in ~~any one of SEQ ID NOs 6, 7, 8 or 9 or (a) fragment(s) thereof~~ SEQ ID NO. 9 and/or a nucleic acid molecule encoding said peptide ~~or (a) fragment(s) thereof~~;

(b) assembly-competent tau-protein(s) and/or fragments thereof; and

(c) a solid support to which said peptide is bound;

said kit optionally further comprising a standard and/or suitable means for detection of said inhibitor.

48. (Previously Presented) A kit comprising an inhibitor of PHF formation of claim 36 or a compositions comprising said inhibitor.

49. (Previously Presented) A method of claim 28, wherein said specific tau derived peptide is expressed in a test system by a nucleic acid molecule.

50. (Currently Amended) A method of claim 49, wherein said test system comprises a nucleic acid molecule encoding at least one of said specific tau derived peptide as defined in ~~at least one of SEQ ID Nos. 6, 7, 8 and 9.~~ SEQ ID NO. 9.

51. (Currently Amended) A method of claim 50, wherein said peptide comprising a specific tau derived peptide as defined in ~~at least one of SEQ ID NOS. 6, 7, 8 and 9~~ SEQ ID NO. 9 is expressed in a test system comprising a non-human transgenic animal, a tissue culture and/or a cell culture system.

52-53. (Canceled)

54. (Currently Amended) A nucleic acid molecule encoding a specific tau derived peptide as defined in ~~SEQ ID Nos. 6, 7, 8 or 9.~~ SEQ ID NO. 9.

55. (New) The composition of claim 40, which is a diagnostic or a pharmaceutical composition.